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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09 808,970	03 16 2001	Sistla R. Moorthy	41176A	6254

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EXAMINER

WITZ, JEAN C

ART UNIT	PAPER NUMBER
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1651

DATE MAILED: 11 19 2002

6

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09 808,970

Examiner

Jean C. Witz

Applicant(s)

MOORTY ET AL.

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a) in no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on 03 September 2002.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-26 is/are pending in the application.
- 4a) Of the above claim(s) 24 and 25 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-23 is/are rejected.
- 7) ☒ Claim(s) 26 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☒ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892) 4) ☐ Interview Summary (PTO-413) Paper No(s) _____
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948) 5) ☐ Notice of Informal Patent Application (PTO-152)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 2 6) ☐ Other _____

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DETAILED ACTION

Election/Restrictions

Applicant's election of Group I, claims 1-23 and 16 in Paper No. 5 is acknowledged. Because applicant did not distinctly and specifically point out the supposed errors in the restriction requirement, the election has been treated as an election without traverse (MPEP § 818.03(a)).

Claim Objections

Claim 26 is objected to under 37 CFR 1.75(c) as being in improper form because a multiple dependent claim should refer to multiple claims in the alternative only. See MPEP § 608.01(n). Accordingly, the claim has not been further treated on the merits.

The claims are replete with spelling errors and errors in punctuation. In claim 8, it appears that the term "active" is missing. Claims 1-23 are objected to because of these informalities. Appropriate correction is required.

Claim Rejections - 35 USC § 112

Claim 15 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim 15 recites improper Markush language. When the phrase "the group consisting of" is used, the members of the group that follow should be linked with the term "and". If the term "the group consisting of" is deleted, the term "or" is proper.

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Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claim 1 is rejected under 35 U.S.C. 102(b) as being anticipated by Wan et al. (vol. 56).

Wan discloses the toxicity of various insecticides such as azadirachtin. One of these compositions contained 49% azadirachtin and 51% constituents from the neem tree (page 433, Table 1). Broadest reasonable interpretation of the claim includes a neem extract containing a biologically effective amount of azadirachtin obtained from natural sources.

Claims 1-5, 14-15, and 17-18 are rejected under 35 U.S.C. 102(b) as being anticipated by Guerrini (AU-B-11220/88).

Guerrini discloses a pesticidal composition containing azadirachtin and an antioxidant such as Vitamin C (page 4). The composition may contain other ingredients, but may also be limited to the azadirachtin and the Vitamin C. Azadirachtin is present in a concentration of 0.1 to 99 parts by weight and Vitamin C is present in a concentration of 1 to 99.8 parts by weight (page 6). Therefore, the cited claims are anticipated by the disclosure.

Claims 1-4, 6, 10-12, 19, 20 and 22 are rejected under 35 U.S.C. 102(b) as being anticipated by Carter et al. ('146).

Carter discloses a composition containing azadirachtin, neem oil, and a surface active agent. See col. 3, lines 65-69. At col. 1, lines 37-40, neem oil is disclosed as a UV absorbing additive known to be added to azadirachtin compositions. The surface active agent is identified as Tween 20 (col. 4, Example 2). Since Carter discloses a composition which contains a biologically effective amount of azadirachtin, a surface active agent, a UV absorbing agent, Carter clearly anticipates the cited claims. Neem oil is also considered an essential oil so the reference anticipates claim 22.

Claim 22 is rejected under 35 U.S.C. 102(b) as being anticipated by WO 92/19616.

The transitional phrase "consisting essentially of" limits the scope of a claim to the specified materials or steps "and those that do not materially affect the basic and novel characteristic(s)" of the claimed invention. *In re Herz*, 537 F.2d 549, 551-52, 190 USPQ 461, 463 (CCPA 1976) (emphasis in original). For the purposes of searching for and applying prior art under 35 U.S.C. 102 and 103, absent a clear indication in the specification or claims of what the basic and novel characteristics actually are, "consisting essentially of" will be construed as equivalent to "comprising." See, e.g., *PPG*, 156 F.3d at 1355, 48 USPQ2d at 1355 ("PPG could have defined the scope of the phrase consisting essentially of for purposes of its patent by making clear in its specification what it regarded as constituting a material change in the basic and novel characteristics of the invention."). If an applicant contends that additional steps or materials in the prior art are excluded by the recitation of "consisting essentially of," applicant has the burden of showing that the introduction of additional steps or

components would materially change the characteristics of applicant's invention. In re De Lajarte, 337 F.2d 870, 143 USPQ 256 (CCPA 1964).

The prior art document discloses a composition containing azadirachtin and oil of citronella (an essential oil). The remaining ingredients do not materially affect the basic and novel characteristic(s) of the combination of azadirachtin and citronella oil.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 5, 13-15, 17-18, and 21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Carter et al. ('146) combined with Guerrini (AU-B-11220/88), in view of Butler ('697).

Applicant claims a composition that contains a biologically effective amount of azadirachtin, a surface active agent, an antioxidant, and a UV light absorbing agent. The surface active agent may be a Triton, Brij, Tween or Span compound. The antioxidant is claimed as Vitamin C, tocopherol, or grape seed oil. The UV light absorbing agent is a vegetable oil.

Carter discloses a composition containing azadirachtin, a UV light absorbing agent which is a vegetable (neem oil), and Tween 20, a surface active agent. Carter

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does not include an antioxidant nor does the reference teach that the surface active agent may also be a saponin, sapogenin or lecithin.

Guerrini discloses a pesticidal composition containing azadirachtin and an antioxidant such as Vitamin C and Vitamin E, which is also known as tocopherol (page 4). The composition may contain other ingredients, but may also be limited to the azadirachtin and the Vitamin C. Azadirachtin is present in a concentration of 0.1 to 99 parts by weight and Vitamin C is present in a concentration of 1 to 99.8 parts by weight (page 6). It would have been obvious to one of ordinary skill in the art to include a known antioxidant in the composition of Carter as Butler teaches that azadirachtin requires stabilization, that various antioxidants, inhibitors and scavengers can stabilize these pesticidal compounds and that "selection of a stabilizer is therefore an empirical process." See col. 2, lines 32-44. Guerrini teaches that Vitamin C and Vitamin E (tocopherol) are appropriate antioxidants for azadirachtin-containing compositions.

Claims 7-9 are rejected under 35 U.S.C. 103(a) as being unpatentable over Carter et al. ('146) combined with Guerrini (AU-B-11220/88), in view of Butler ('697) and further in view of Stetter et al., Kulperger, Nakayama et al. and Liang et al.

Stetter et al., Kulperger, Nakayama et al. and Liang et al. all disclose that lecithin and saponins and sapogenins from Saponaria, Quillaja, Chlorogalum and Sapindus have surfactant properties. Absent objective evidence of surprising or unexpected results, the selection of a known surfactant for use in a composition known to include a surfactant is deemed within the skill of the practitioner. It is the known surfactant

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properties of the claimed components that motivate the practitioner to use them for that purpose.

Claim 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Carter et al. ('146) combined with Guerrini (AU-B-11220/88), in view of Butler ('697) and further in view of Jitoe et al.


Jitoe et al. discloses that tropical gingers including Curcuma and Zingiber contain antioxidants. Absent objective evidence of surprising or unexpected results, the selection of a known antioxidant for use in a composition known to include an antioxidant is deemed within the skill of the practitioner. It is the known antioxidant properties of the claimed components that motivate the practitioner to use them for that purpose.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jean C. Witz whose telephone number is (703) 308-3073. The examiner can normally be reached on 6:30 a.m. to 4:00 p.m. M-Th and alternate Fridays.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Wityshyn can be reached on (703) 308-4743. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 872-9306 for regular communications and (703) 872-9307 for After Final communications.

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Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0196.



Jean C. Witz
Primary Examiner
Art Unit 1651

November 18, 2002